abnormal blood gas values. I.P.P.V. affords greater patient comfort, both by preventing painful over-riding of fractured ribs and by permitting the use of adequate doses of analgesics. The early use of I.P.P.V. will tend to obviate the later development of the "wet-lung" syndrome. Furthermore, the use of I.P.P.V. by effecting the internal splinting of the fractured ribs prevents subsequent gross deformity of the thoracic cage.

Dr. Leigh also refers to the possible deleterious effects of I.P.P.V. on cardiac output and cerebral blood flow. Our usual practice is to use the minimum positive pressure commensurate with adequate ventilation. However, the pressure required depends on the state of the lungs, and if the compliance is low, high inflationary pressures are necessary. If severe hypotension does occur as the result of I.P.P.V., this is treated with vasoconstrictor drugs.—We are, etc.,

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Accident Services

SIR,—Mr. Daniel Lamont's letter (6 May, p. 374) raises questions which are of fundamental importance to ambulance services, to first-aid teaching, and to the need for hospital-based flying squads to give on-the-spot resuscitation. I have tried to get recent evidence of the causes of death in those brought in dead following road-traffic accidents in this county, and have failed to find hard facts which could be used to decide how many of these deaths could be averted by medical care subsequent to the injury.

Pathologists vary in their estimates of deaths from airway obstruction — some putting the figure as high as 25%; others, regarding agonal vomiting as a "normal" finding, give a lower percentage. Neurosurgeons cite pneumonia due to inhaled vomit or secretion as the commonest cause of death following head injuries in which the brain damage does not kill the patient. The number of deaths from airway obstruction and from the inhalation of vomit or secretions can be influenced by good first aid.

Some deaths may occur at the scene of an incident, and some casualties could not be saved by any techniques available today. What percentage of the total do these cases represent? What is the role of airway obstruction, bleeding, and other causes in such deaths? And, out of those found alive at the scene of an incident, how many could be kept alive by a combination of first aid and resuscitation? What are the causes of death during the ambulance ride? What percentage of these deaths is preventable? And what action is required to improve the existing situation?—I am, etc.,

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Esso Refinery,
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Unexpected Foreign Body

SIR,—I wonder what percentage of dentures are made with radio-opaque material?

This week a patient presented himself at the surgery with a persistent cough present for about four months. Four months ago he had an accident at the pit during which he was knocked unconscious. He missed his dentures at the time but did not think it worth mentioning to me. Since then he has been in and out of the surgery with a cough, purulent sputum, etc. An *x*-ray of the chest six weeks ago was negative. Yesterday during a most violent paroxysm of coughing he coughed up his dentures, which measured about 2 in.×½ in. (5.08 cm.×1.27 cm.) and came, presumably, from his trachea.

He has since then had a repeat chest *x*-ray, once more negative, and also an *x*-ray of his dentures, which were not opaque. Surely this is dangerous and such dentures should not be allowed to be made.—I am, etc.,

G. STEIN.

Sutton-in-Ashfield,
Nottinghamshire.

Intrauterine Contraceptive Devices

SIR,—I have read with interest the article on intrauterine contraceptive devices in the "Current Practice" series, written by Dr. J. Frampton and Mr. D. Mathews (10 June, p. 683). Since they mention the Saf-T Coil but have no figures available yet, I think this is a good time to mention to you the preliminary findings of a series I am doing.

The patients are drawn from the Oldchurch Hospital gynaecological department and the Westminster Branch of the Family Planning Association.

During the year June 1966 to May 1967 162 patients were fitted with a Saf-T Coil 33S. This is the device with the double spiral and two nylon threads in the cervical canal. A total of 694 woman months have been recorded. The expulsion rate and removal rate compare very favourably with the published figures of other devices. Two devices have been expelled, both two months after insertion during a menstrual period.

Seven devices have been removed: one after nine months as a further pregnancy was desired; one after one month for sepsis (this device was inserted early in the puerperium); five for menorrhagia (three of these were noted to have menorrhagia before).

Of this series, 12 patients had already expelled Lippes Loops C. Four of these had expelled them on two occasions. Two other patients had already tried Lippes Loop C but the device had been removed for menorrhagia. Two patients had tried Birnberg bows, but these were removed for menorrhagia. Thus in this series a total of 16 patients had already found other devices unsatisfactory.

As many of the patients wished for maximum protection from pregnancy they were offered the opportunity of using Emko foam as well, but it was discovered that most of these discontinued the foam after the first two months. A total of 33 patients elected to use the foam. One patient in this series has become pregnant.

A total of 497 woman months have been observed where the Saf-T Coil alone was the only method of contraception. This compares very favourably with the pregnancy rate of other devices. It is interesting that the two expulsions and the pregnancy occurred in patients who were fitted with their devices in the months of January, February, and March this year when the fixed red marker on the introducer had been changed to an adjustable one. I feel that these three devices may well have been inserted too low into the uterus, and since this technique has been adjusted no further expulsions have occurred.

This preliminary report suggests that the Saf-T Coil may well have a lower pregnancy rate and expulsion rate than other devices so far reported.—I am, etc.,

KATHLEEN FRITH.

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SIR,—May I add our experience with the Saf-T-Coil 33-S to your very helpful article on intrauterine contraceptive devices by Dr. John Frampton and Mr. Dudley Mathews (10 June, p. 683).

In this practice I have now inserted 50 Saf-T-Coils, covering a period of approximately 200 woman months, and have been more than favourably impressed by:

(1) The ease of insertion; there have been no failures to introduce the coil.

(2) No cervical dilatation has been found to be necessary in any case.

(3) None have been expelled.

(4) Patient acceptability. There have been no requests to remove the coil.

(5) The advantage of a complete unit in a pre-sterilized pack, which means there is no need to sterilize any other instrument.

(6) Last, but not least, no pregnancies to date.—I am, etc.,

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Kent.

Hypophysitis and Hypopituitarism

SIR,—The description of the case of hypophysitis and hypopituitarism by Drs. R. Hume and G. Hefin Roberts (27 May, p. 548) certainly suggests an autoimmune basis for the disease. A number of patients with hypopituitarism for which no cause has been found have been studied at Charing Cross Hospital. Sera have been sent to my colleagues with the suggestion that pituitary antibodies might be present. Preliminary investigations only have so far been made, but clearly pituitary antibodies should be sought in patients with idiopathic hypopituitarism.—I am, etc.,

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"Cruachan"

SIR,—The article on "Cruachan" (17 June, p. 758) was of great interest to me. In London a hostel for diabetic children, now at Palingswick House, Hammersmith, has long experience of the problems mentioned in the article and has been dealing with them since its foundation, originally at Hutton during the war (1939–45), when the need presented itself for special arrangements for diabetic children in the evacuation period.

It is the experience of this Inner London Education Authority hostel that an increasing number of the children needing such provision show, in addition to the diabetes, various disorders of behaviour and very frequently a social problem also.

Only a small proportion of diabetic children need hostel accommodation, and for differing lengths of time, but for those who do there can be little doubt that it is a valuable measure, and most of them learn quickly to manage their own diabetic life.—I am, etc.,

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